California Energy Commission

# Funding and Savings for Energy Efficiency Programs for Program Years 2000 through 2004

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**Figure 1**
**Annual Spending for Energy Efficiency Programs**
**($1.4 billion was spent for PY 2000-2004 with an average of $286 million per year)**

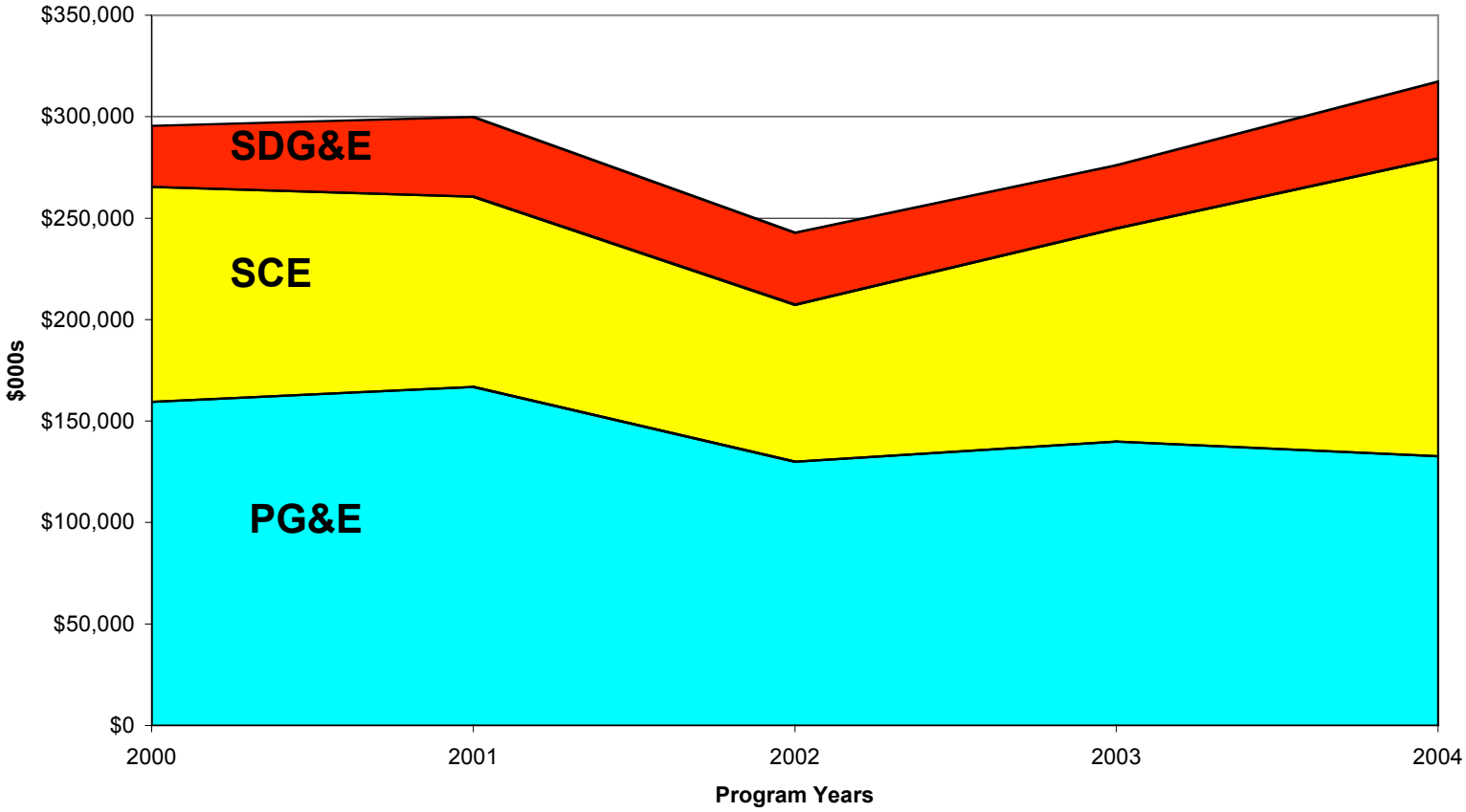

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**Figure 2**
**Cumulative Spending by Sector for PG&E, SCE and SDG&E for Program Years 2000-2004**
**($1.4 billion was spent for PY 2000-2004 with an average of $286 million per year)**

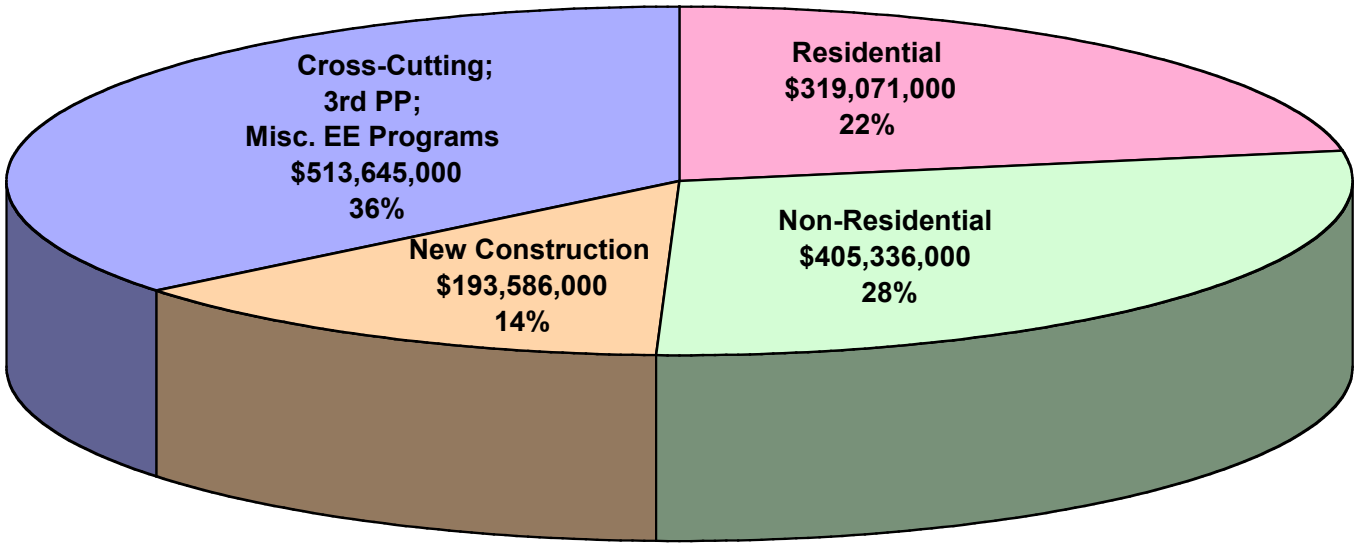

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**Figure 3**
**Spending by Sector for PG&E, SCE and SDG&E for Program Years 2000-2004**
**($1.4 billion was spent for PY 2000-2004 with an average of $286 million per year)**

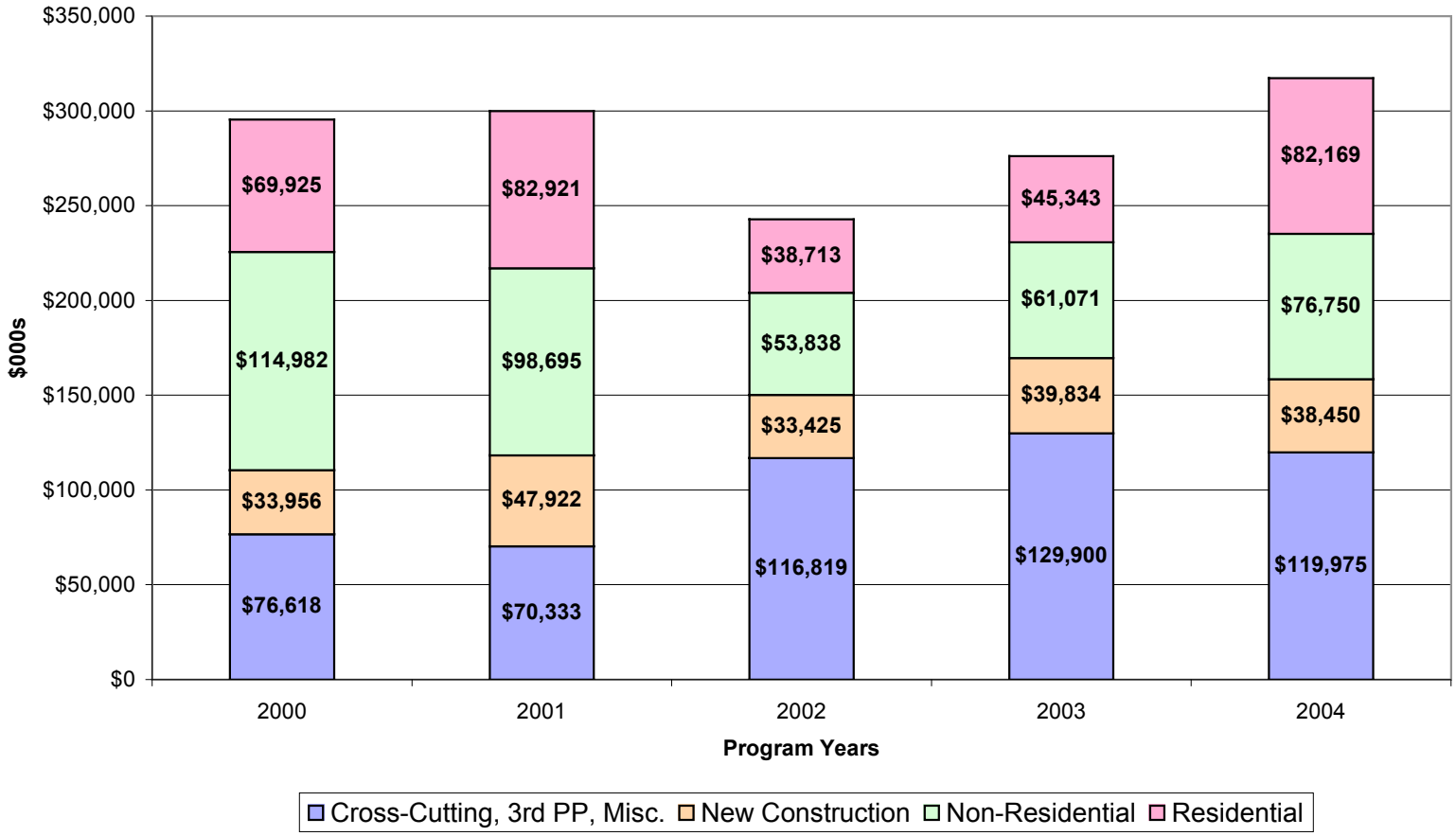

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**Figure 4**
**Annual Spending for Energy Efficiency Programs by PG&E, SCE and SDG&E for PY 2000-2004**
**($1.4 billion was spent for PY 2000-2004 with an average of $286 million per year)**

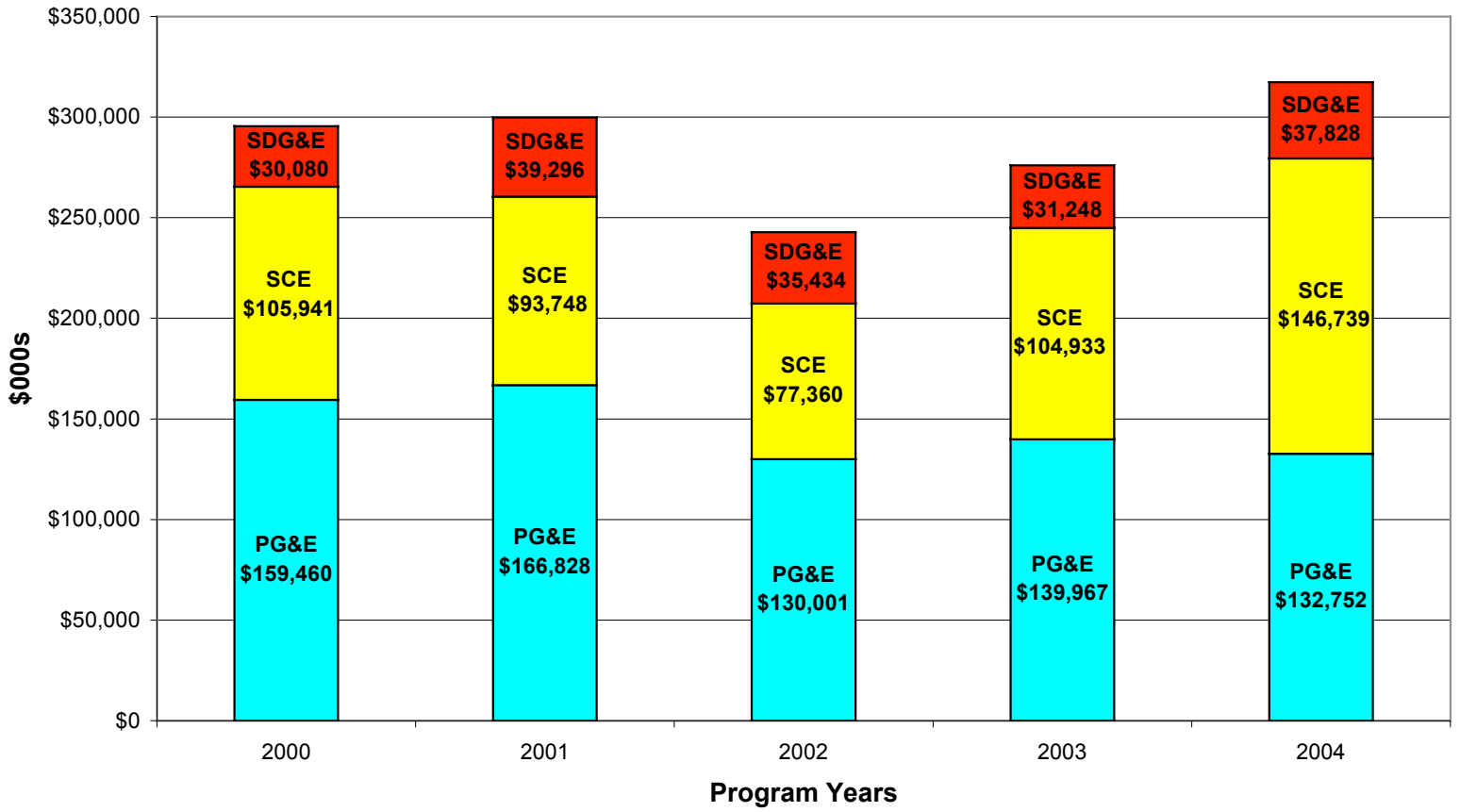

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**Figure 5**
**First Year Savings (GWh/yr) by Utility Energy Efficiency Programs**

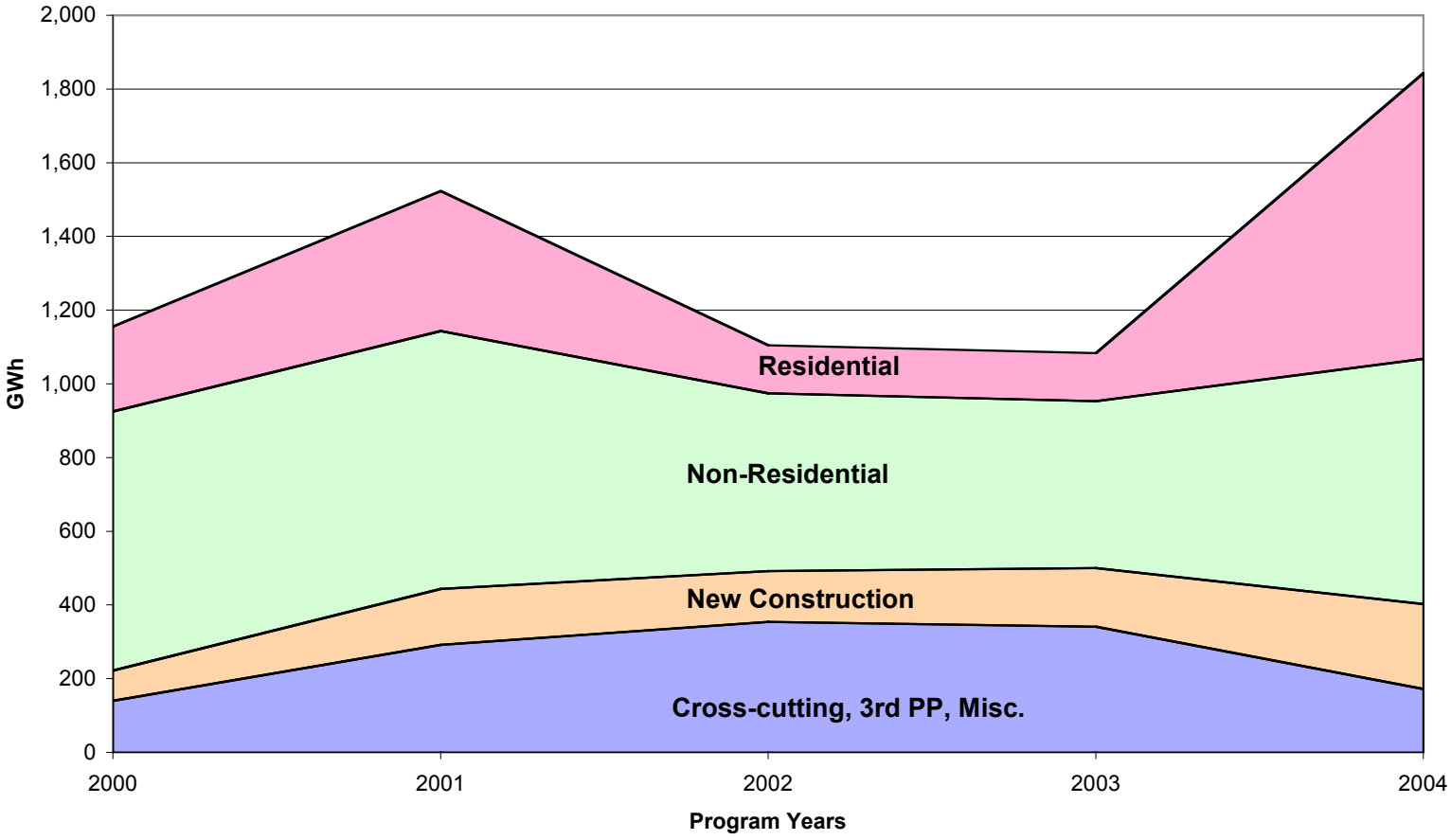

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**Figure 6**
**First Year Peak Savings of Utility Energy Efficiency Programs**

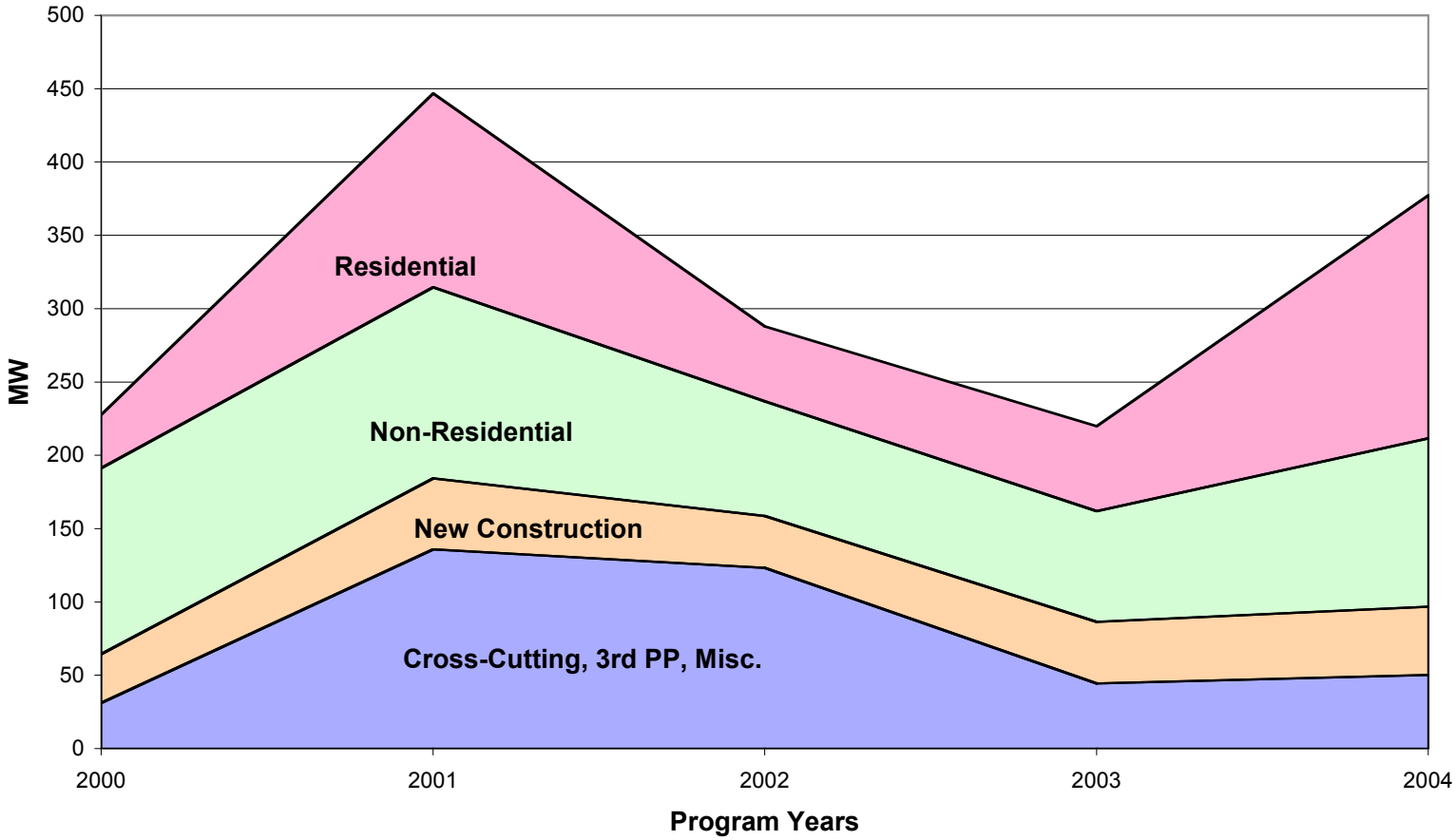

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**Figure 7**
**Summary of Cost Effectiveness by Sector for PG&E, SCE and SDG&E for Program Years 2000-2004**

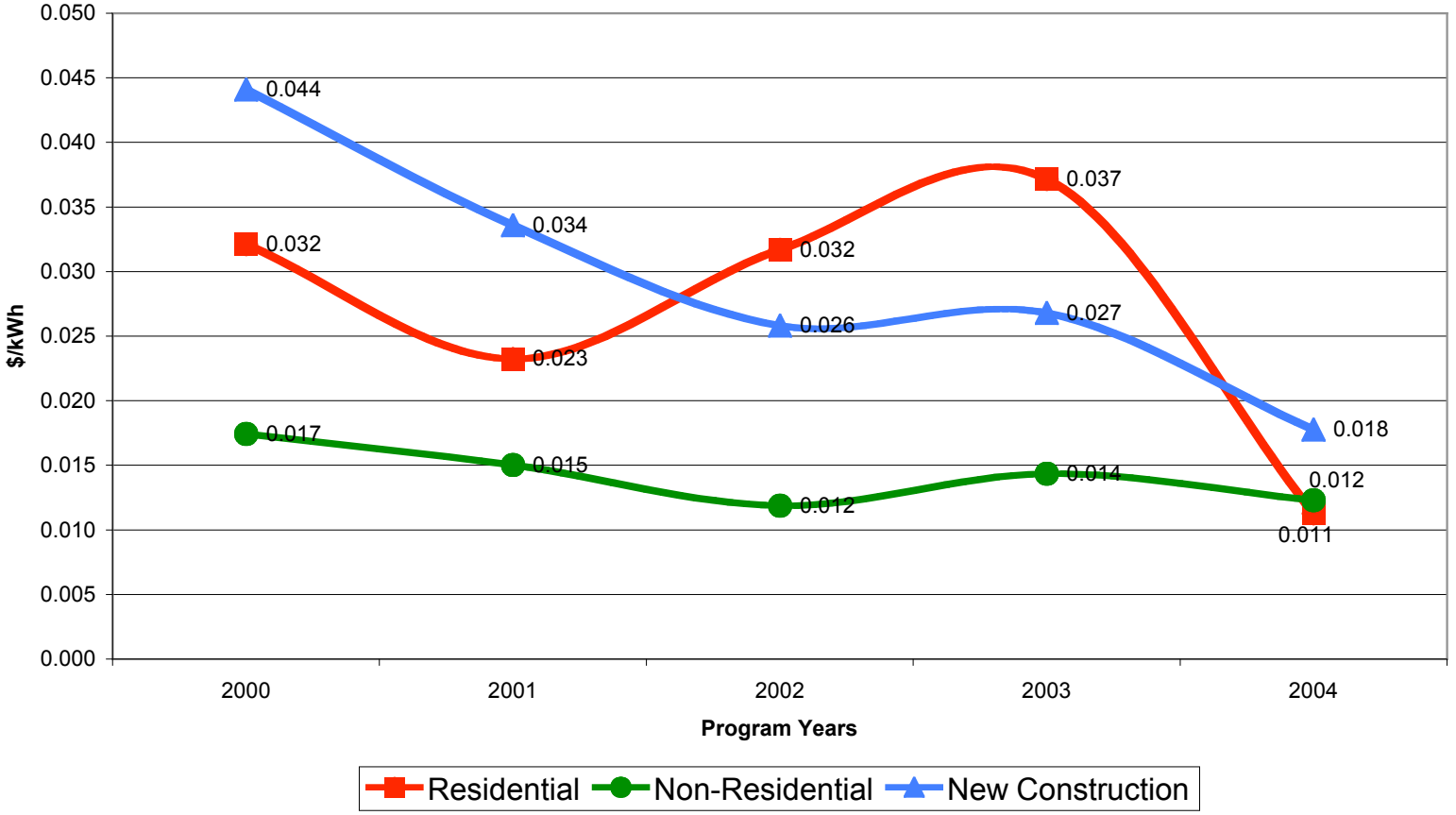
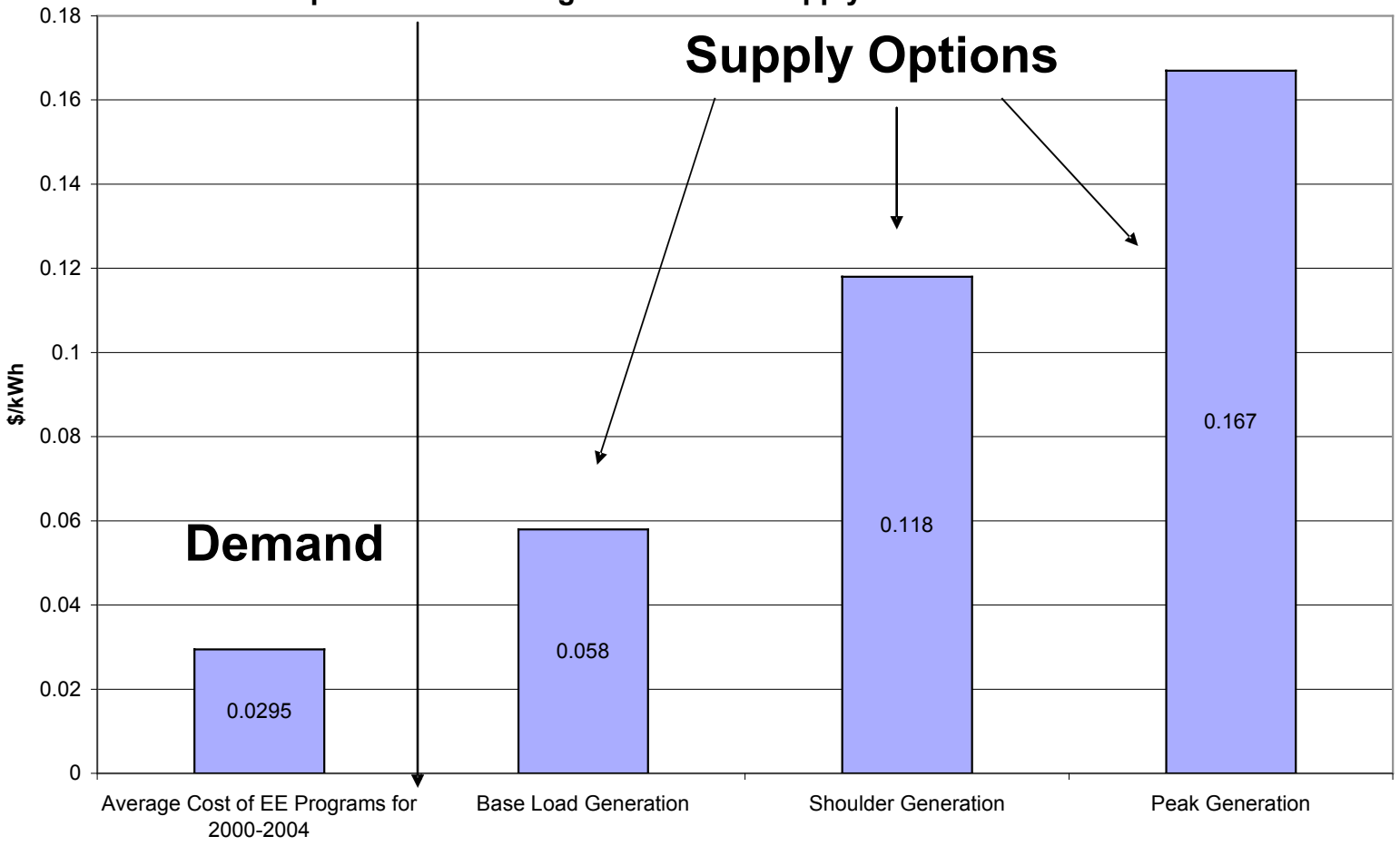


**Figure 8**
**Comparison of EE Program Costs to Supply Generation Costs**



To calculate the levelized cost of conserved energy, we used the following formulas:

$$\text{Levelized Cost of Conserved Energy} = \frac{\text{Program Costs x CRF}}{\text{First year kWh saved}}$$

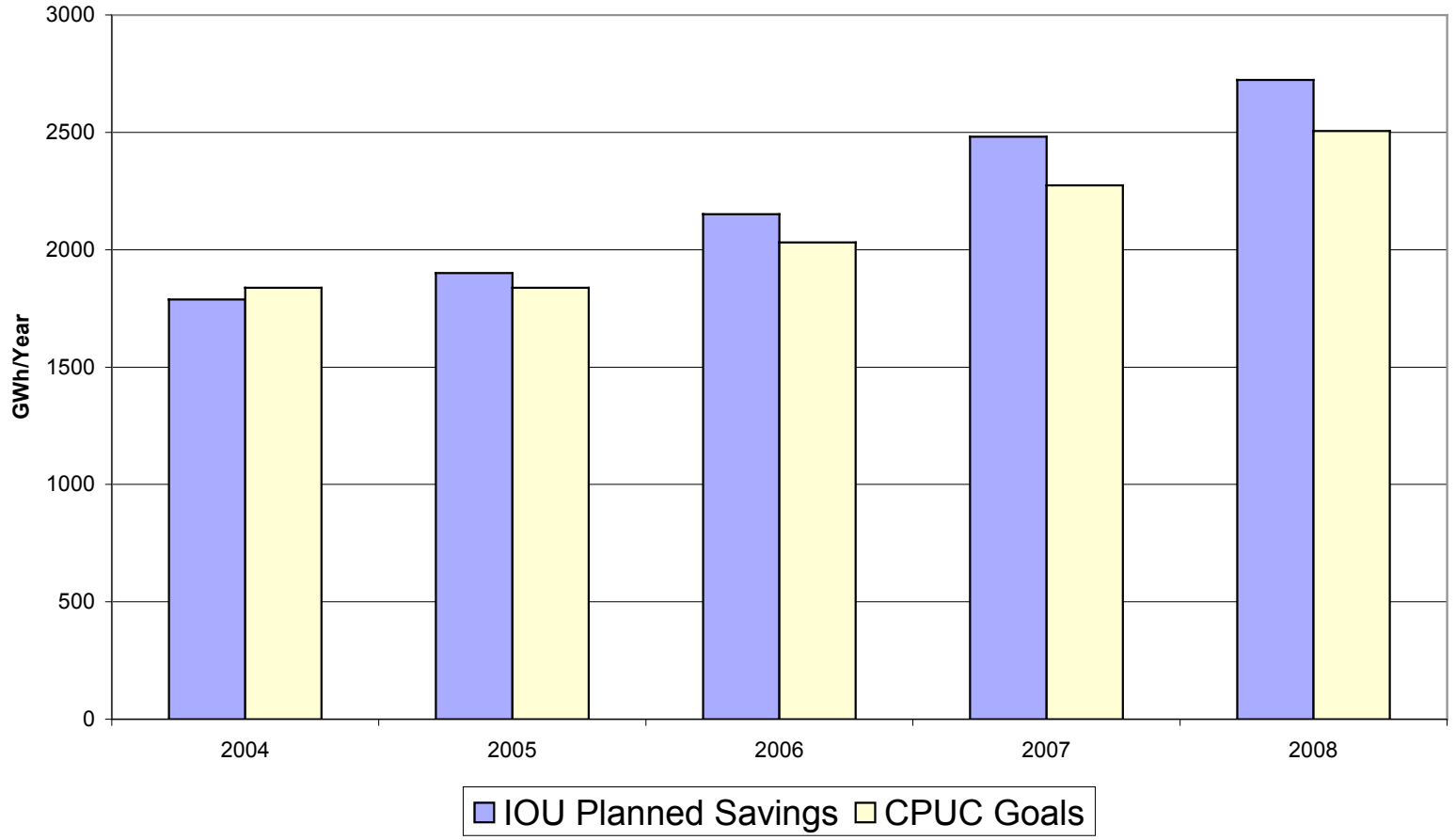
$$\text{Capital Recovery Factor (CRF)} = \frac{i\,(1 + i)^n}{(1 + i)^n - 1}$$

i = real discount rate

n = useful life period

These calculations assume an average useful measure life of 12 years and real discount rate of 4% per year.

**Figure 9**
**IOU Projected Savings Compared to Goals 2004-2008**



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## Table 1: Funding for 2006-2008 Programs ($000)

| | 2006 | % Diff from Previous Year | 2007 | % Diff from Previous Year | 2008 | % Diff from Previous Year |
|---|---|---|---|---|---|---|
| PG&E | $240,000 | 83% | $281,000 | 17% | $345,000 | 23% |
| SCE | $243,000 | 43% | $243,000 | 0% | $243,000 | 0% |
| SDG&E | $81,000 | 107% | $91,000 | 12% | $106,000 | 16% |
| SCG | $48,000 | 47% | $61,000 | 27% | $73,000 | 20% |

# Uncertainties in Achieving Goals

- Future potential could increase or decrease the long-term efficiency goals, depending on cost-effectiveness, equipment saturations, standards, or emerging technologies
- Changes in counting conventions could skew programs toward short-term rather than longer-term, more innovative projects
- Corrections to previously overstated savings values and rising free ridership may make achieving goals more difficult; ramping up expenditures may be difficult
- 2013 savings depend on expanding customer base, developing innovative program strategies that lead to continued savings in the later years, and incorporating emerging technologies

# Municipal Utilities Energy Efficiency Rebate and Incentive Programs

- Air Conditioner/HVAC Rebates
- Cool Roof Rebates
- Energy Audit
- Energy Conservation Tips
- Energy Star Rebates
- Exit Signs Rebates
- Free Shade Trees
- Heat Pump Rebates
- Lighting Savings/Rebates
- New Construction Incentives
- Pool Pump Rebates
- Refrigerator Rebates
- Solar/Photovoltaic Rebates
- Weatherization Rebates

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- **Energy Star Rebates –**encourages customers to purchase Energy Star products by offering rebates to help offset the usually higher price of these products
- **Exit Signs** – replace standard exit signs with Energy Star exit signs, which use five watts or less per sign
- **Free Shade Trees –**helps cool down a house or building thereby lessening the need for air conditioning which can lower energy bill
- Heat Pumps -